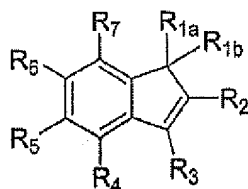


WHAT IS CLAIMED IS:

1. An indene derivative of formula (I) or a pharmaceutically acceptable salt thereof:

5

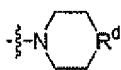


(I)

wherein,

R_{1a} is OH or H;

R_{1b} is C_{1-6} alkyl, C_{3-6} cycloalkyl, benzyl or phenyl, the phenyl being
 10 optionally substituted with one or more substituents selected from the group consisting of halogen, CN, NH_2 , NO_2 and OR^a , when R_{1a} is OH; when R_{1a} is H,

R_{1b} is OR^a , NR^bR^c , $NHCOR^a$ or ;

R_2 is CN, CO_2R^a or $CONR^eR^f$;

R_3 is phenyl optionally substituted with one or more substituents selected
 15 from the group consisting of halogen, CN, NH_2 , NO_2 , OR^a and C_{1-6} alkyl; and

R^4 , R^5 , R^6 and R^7 are each independently H, $O(CH_2)_mR^g$ or CH_2R^h ;

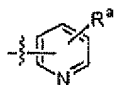
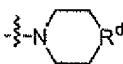
in which


R^a is H, C_{1-6} alkyl or C_{3-6} cycloalkyl, the C_{1-6} alkyl and C_{3-6} cycloalkyl
 being optionally substituted with one or more halogens;

20 R^b , R^c , R^e and R^f are each independently H, C_{1-6} alkyl, C_{3-6} cycloalkyl or benzyl;

R^d is O, S or NR^a ;

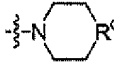
- 56 -

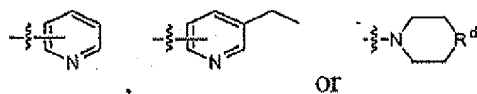
R^g is H, , , or phenyl, the phenyl being optionally substituted with one or more substituents selected from the group consisting of halogen, CN, NH₂ and NO₂;

R_h is ; and

5 m is an integer in the range of 1 to 3.

2. The compound of claim 1, wherein R_{1b} is C₁₋₆ alkyl, C₃₋₆ cycloalkyl, benzyl or phenyl, the phenyl being optionally substituted with one or more methoxy groups,

when R_{1a} is OH; when R_{1a} is H, R_{1b} is OR^a, NR^bR^c, NHCOR^a or ; R_3 is
10 phenyl being optionally substituted with one or more halogens or C₁₋₄ alkyls; and
 R_4 and R_7 is H, in which R^a is H or C₁₋₆ alkyl; R^d is O or S; R^g is H, phenyl,



3. The compound of claim 1, wherein R_3 is phenyl, R_5 is H, and R_6 is O(CH₂)_mR^g
15 or CH₂R^h.

4. The compound of claim 1, which is selected from the group consisting of:

1-hydroxy-6-methoxy-1,3-diphenyl-1H-indene-2-carboxylic acid ethyl ester,

20 1-hydroxy-6-methoxy-1-(3-methoxy-phenyl)-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,

1-hydroxy-1-isopropyl-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,

1-hydroxy-6-methoxy-1-methyl-3-phenyl-1H-indene-2-carboxylic acid

- ethyl ester,
1-benzyl-1-hydroxy-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid
ethyl ester,
1-cyclohexyl-1-hydroxy-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid
5 ethyl ester,
1-hydroxy-1,3-diphenyl-6-(3-phenyl-propoxy)-1H-indene-2-carboxylic
acid ethyl ester,
1-hydroxy-6-(2-morpholine-4-yl-ethoxy)-1,3-diphenyl-1H-indene-2-
carboxylic acid ethyl ester,
10 1-hydroxy-6-morpholine-4-yl-methyl-1,3-diphenyl-1H-indene-2-
carboxylic acid ethyl ester,
1-hydroxy-1,3-diphenyl-6-(2-pyridine-2-yl-ethoxy)-1H-indene-2-
carboxylic acid ethyl ester,
1-hydroxy-1,3-diphenyl-6-(3-phenyl-propoxy)-1H-indene-2-
15 Carbonitrile,
1-hydroxy-1,3-diphenyl-6-(3-phenyl-propoxy)-1H-indene-2-carboxylic
acid methyl ester,
1-hydroxy-6-methoxy-1,3-diphenyl-1H-indene-2-carboxylic acid,
1-hydroxy-6-methoxy-1-methyl-3-phenyl-1H-indene-2-carboxylic acid,
20 1-benzyl-1-hydroxy-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid,
1-hydroxy-1,3-diphenyl-6-(3-phenyl-propoxy)-1H-indene-2-carboxylic acid,
1-cyclohexyl-1-hydroxy-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid,
1,6-dimethoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,
1-ethoxy-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,
25 1-amino-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,
1-amino-3-phenyl-6-(3-phenyl-propoxy)-1H-indene-2-carboxylic acid ethyl
ester,
1-amino-6-(2-morpholin-4-yl-ethoxy)-3-phenyl-1H-indene-2-carboxylic
acid cyclohexyl amide,
30 1-amino-3-phenyl-6-(3-phenyl-propoxy)-1H-indene-2-carbonitrile,

- 58 -

1-acetylamino-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,

6-methoxy-3-phenyl-1-propionylamino-1H-indene-2-carboxylic acid ethyl ester,

5 1-acetylamino-3-phenyl-6-(3-phenyl-propoxy)-1H-indene-2-carboxylic acid ethyl ester,

1-acetylamino-6-(2-morpholin-4-yl-ethoxy)-3-phenyl-1H-indene-2-carboxylic acid cyclohexyl amide,

1-diethylamino-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,

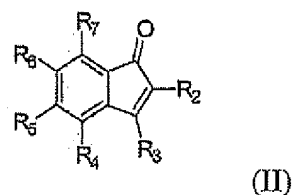
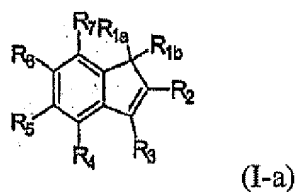
1-ethylamino-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,

6-methoxy-1-morpholin-4-yl-3-phenyl-1H-indene-2-carboxylic acid ethyl ester,

1-benzyl amino-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester, and

1-cyclohexyl amino-6-methoxy-3-phenyl-1H-indene-2-carboxylic acid ethyl ester.

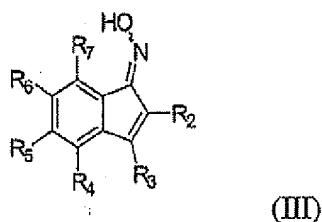
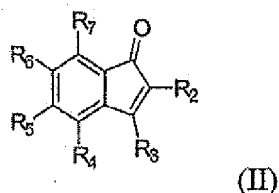
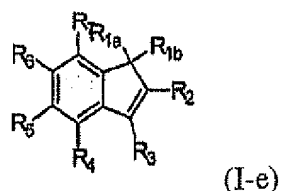
5. A process for preparing a compound of formula (I-a) which comprises reacting a compound of formula (II) with a Grignard reagent:



wherein R_{1a} is OH; R_{1b} is alkyl, phenyl or benzyl; and R₂, R₃, R₄, R₅, R₆ and R₇ have

the same meaning as defined in claim 1.

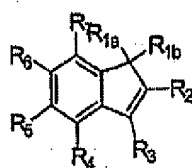
6. A process for preparing a compound of formula (I-e) which comprises reacting a compound of formula (II) with hydroxyl amine to obtain a compound of
 5 formula (III), and hydrogenation of the compound of formula (III) followed by reacting with acetyl chloride or an anhydrous acetic acid:



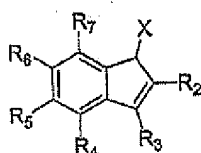
- 10 wherein R_{1a} is H; R_{1b} is NH_2 or $NHCOR^a$; and R_2 , R_3 , R_4 , R_5 , R_6 and R_7 have the same meaning as defined in claim 1.

7. A process for preparing a compound of formula (I-d) which comprises halogenation of a compound of formula (VIII) to obtain a compound of formula
 15 (IV), and reacting the compound of formula (IV) with an amine or alcohol compound:

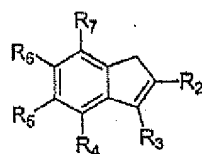
- 60 -




(I-d)



(IV)



(VIII)

wherein R_{1a} is H; R_{1b} is OR^a , NR^bR^c or ; X is halogen; and R_2 , R_3 , R_4 , R_5 ,

5 R_6 and R_7 have the same meaning as defined in claim 1.

8. A pharmaceutical composition for modulating the activities of peroxisome proliferator activated receptors (PPARs) comprising a therapeutically effective amount of the compound or a salt defined in claim 1 as an active ingredient together
10 with a pharmaceutically acceptable carrier.

9. The composition of claim 8, which is used for the treatment and prevention of diabetes, obesity, arteriosclerosis, hyperlipidemia, hyperinsulinism, hypertension, osteoporosis, liver cirrhosis, asthma and cancer.

15